

# **Department of Energy**

Washington, DC 20585 January 5, 1996

Mr. Robert E. Lawrence
Project Director
MK-Ferguson Company
Uranium Mill Tailings Remedial
Action Project
P.O. Box 9136
Albuquerque, New Mexico 87119

Dear Mr. Lawrence:

This letter is in response to your April 24, 1995, request for five exemptions from certain provisions contained in Title 10, Code of Federal Regulations, Part 835 (10 CFR 835), "Occupational Radiation Protection." Specifically, this letter concerns your request for exemption from certain provisions contained in sections 404(b), 1101(a), 1101(c)(1), 1101(c)(2), and 1101(d). The purpose of the exemption request is to obtain relief from requirements associated with releasing material from radiological areas to controlled areas.

The Office of Worker Health and Safety (EH-5) conducted a technical review of the exemption requests (enclosure 1). Based on our review of the materials that were provided to us and subsequent conversation with your staff (reference November 1, 1995, telephone conversation between Mr. Peter V. O'Connell of the Office of Worker Protection Programs and Hazards Management, and Messrs. David Andrews and Michael Lewandowski of Uranium Mill Tailings Remedial Action Project), the Department of Energy (DOE) is granting an exemption from the 10 CFR 835.1101(a)(2) requirement. This exemption allows the release of mill tailings haul trucks from radiological areas to controlled areas when prior use suggests that the contamination levels on inaccessible surfaces are likely to exceed the values specified in appendix D to 10 CFR 835. This exemption is contingent upon your complying with the conditions specified in the enclosed (enclosure 2) exemption decision.

The above exemption only applies to the release of uranium mill tailing haul trucks from a radiological area to a controlled area. The criteria for unrestricted release of property from DOE facilities are currently set forth in DOE Order 5400.5, "Radiation Protection of the Public and Environment." DOE has addressed such releases in the proposed rule, 10 CFR 834.

For the other exemptions that you requested, it was determined that an exemption was not necessary; rather, we are providing additional guidance concerning the intent of the applicable 10 CFR 835 requirements. Applicable additional guidance is contained in the enclosed technical position.

The DOE Office of Environmental Management (EM) staff concur with this response.

Sincerely,

Tara O'Toole, M.D., M.P.H.

Assistant Secretary

Environment, Safety and Health

#### 2 Enclosures

cc w/enclosure:
Thomas P. Grumbly, EM-1
Robert K. Christopher, EH-3
Docketing Clerk, EH-3
Bruce G. Twining, Albuquerque
Operations Office
Radiological Control
Coordinating Committee
Price Anderson Amendments
Act Coordinator

# TECHNICAL POSITION

Uranium Mill Tailings Remedial Action Project Title 10 Code of Federal Regulations Part 835

The Uranium Mill Tailings Remedial Action Project/MK-Ferguson Company (UMTRA/MKF) has requested exemption from certain requirements of Title 10, Code of Federal Regulations, Part 835 (10 CFR 835), "Occupational Radiation Protection." All of these exemption requests have been submitted in consideration of certain practices related to release of haul trucks from Contaminated Areas to Controlled Areas.

#### Discussion

#### Request

Specifically, UMTRA/MKF has requested permanent exemption from the requirements of  $\S\S$  835.404(b), 835.1101(a), 835.1101(c)(1), 835.1101(c)(2), and 835.1101(d). Section 3 of the exemption request describes the UMTRA/MKF operations and discusses how they are affected by these requirements.

## Requirements from Which Exemption is Sought

- § 835.404 Radioactive contamination control and monitoring.
- (b) Appropriate controls shall be maintained and verified which prevent the inadvertent transfer of removable contamination to locations outside of radiological areas under normal operating conditions.
- § 835.1101 Releases of materials and equipment from radiological areas.

The following requirements apply for the release of materials and equipment from radiological areas for use in controlled areas:

- (a) In radiological areas established to control surface or airborne radioactive material, material and equipment shall be treated as radioactive material and shall not be released from radiological areas to controlled areas if either of the following conditions exist:
- (1) Measurements of accessible surfaces show that either the total or removable contamination levels exceed the values specified in appendix D to this part; or
- (2) Prior use suggests that the contamination levels on inaccessible surfaces are likely to exceed the values specified in appendix D to this part.

- (c) Material and equipment with fixed contamination levels that exceed the limits specified in appendix D to this part may be released for use in controlled areas outside of the radiological areas with the following provisions:
- (1) Removable contamination levels are below the level specified in appendix D of this part; and
- (2) Materials shall be routinely monitored, clearly labeled, or tagged to alert personnel of the contamination status; appropriate administrative procedures shall be established and exercised to maintain control of these items.
- (d) The records for release of material and equipment shall describe the property, date on which the release survey was performed, identity of the individual who performed the survey, type and identification number of the survey instrument used, and results of the survey.

### **Analysis**

The Office of Worker Protection Programs and Hazards Management (EH-52) reviewed the request for exemptions from five requirements of 10 CFR 835 and the results are as follows.

1. UMTRA/MKF requested that the contamination control and monitoring program described in the exemption request be considered appropriate controls per 10 CFR 835.404(b) to prevent the inadvertent release of removable contamination to locations outside of radiological areas under normal operating conditions. UMTRA/MKF also requested allowance to survey a statistical sampling of material being released to the controlled area to meet the requirement of 10 CFR 835.1101(c)(2) which states, in part, that materials shall be routinely monitored.

Based on our review of the materials that were provided to us, we have determined that UMTRA/MKF has not requested an exemption from 10 CFR 835.404(b) or 1101(c)(2) but has instead requested that DOE determine if their approach to implementation of these provisions meets the intended purpose. 10 CFR 835 requires implementation of appropriate controls to prevent the spread of contamination. These controls must be documented in a DOE approved Radiation Protection Program (RPP). The physical layout and operation of the facility, the facility history of the effectiveness of their contamination control program, and the relative potential hazard of the material being released should all be taken into consideration when developing and approving appropriate contamination controls. UMTRA/MKF should ensure that their DOE approved RPP reflects their contamination control program as described in the exemption request.

2. UMTRA/MKF requested exemption from the recordkeeping requirements of 10 CFR 835.1101(d). Specifically, the UMTRA/MKF requested that records only be maintained for those pieces of equipment that are surveyed for removable contamination.

EH-52 reviewed this request and noted that the referenced rule requirement does not require monitoring records for each piece of equipment released. The rule requires that records only be retained for the surveys that are performed. Accordingly, an exemption from this provision is not necessary. The proposed methodology should be incorporated into the RPP.

3. UMTRA/MKF requested exemption from the requirement of § 835.1101(c)(1). Specifically, the UMTRA/MKF requested allowance to assume that the fixed contamination levels exceed the limits specified in appendix D to 10 CFR 835 without verifying this assumption through a total contamination survey.

The requirements of 10 CFR 835 do not preclude assuming that the fixed contamination levels exceed the limits specified in appendix D to 10 CFR 835 without verifying this assumption through a total contamination survey. Accordingly, an exemption from this provision is not necessary. Again, we suggest that UMTRA/MKF reflect this aspect of their program in their RPP.

4. UMTRA/MKF requested exemption from 10 CFR 835.1101(a) for release of materials and equipment, specifically mill tailings haul trucks from radiological areas for use in controlled areas when prior use suggests that the contamination levels on inaccessible surfaces are likely to exceed the values specified in appendix D to 10 CFR 835.

EH-52 has determined that the request meets the requirements for granting an exemption as specified in 10 CFR 820. Specifically, UMTRA/MKF has provided sufficient indication that the requested exemption meets the special circumstances provided in 10 CFR 820.62(d)(2), "Application of the requirement in the particular circumstances would not serve or is not necessary to achieve its underlying purpose, or would result in resource impacts which are not justified by the safety improvements." This determination was based on the low levels of contamination, the dose and cost savings in performing the remediation work quicker, and the inaccessibility of the material to create a hazard to workers or members of the public.

EH-52 noted that no information is provided regarding usage of the trucks outside the scope of the UMTRA/MKF program or if maintenance or repair services involving access to the potentially contaminated surfaces of the vehicles is controlled. Accordingly, this exemption is conditional upon UMTRA/MKF incorporating the following controls in their RPP:

- o All maintenance or repair services involving access to the potentially contaminated surfaces of the vehicles are to be conducted as radiological work in controlled areas, or the vehicles are to be surveyed in accordance with 10 CFR 835.1101(a) prior to performing the work on the vehicles; and
- o The vehicles may only be used to transport UMTRA/MKF related material, or the vehicle is to be surveyed in accordance with 10 CFR 835.1101(a) prior to other use.

The above exemption only applies to the release of uranium mill tailings haul trucks from a radiological area to a controlled area. The criteria for unrestricted release of property from DOE facilities are currently set forth in DOE Order 5400.5, "Radiation Protection of the Public and Environment." DOE has addressed such releases in the proposed rule, 10 CFR part 834.

### Conclusion

Consistent with the technical justification and conditions provided above, EH-52 concurs with the subject exemption request.

#### PART 835 EXEMPTION DECISION

Pursuant to Title 10, Code of Federal Regulations, Part 820.61 (10 CFR 820.61), the Assistant Secretary for Environment, Safety and Health is authorized to exercise authority on behalf of the Department of Energy (DOE) with respect to requests for exemptions from nuclear safety rules relating to radiological protection of workers, the public, and the environment.

The Uranium Mill Tailings Remedial Action Project/MK-Ferguson Company (UMTRA/MKF) has requested exemption from certain requirements of Title 10, Code of Federal Regulations, Part 835 (10 CFR 835), "Occupational Radiation Protection." Specifically, UMTRA/MKF has requested exemption from the requirements of §§ 835.404(b), 835.1101(a), 835.1101(c)(1), 835.1101(c)(2), and 835.1101(d). All of these exemption requests have been submitted in consideration of certain practices related to release of haul trucks from Contaminated Areas to Controlled Areas.

The request states that the exemption is not prohibited by law; will not present undue risk to the public health and safety, the environment, or facility workers; and is consistent with the safe operation of a DOE nuclear facility.

Based on a review of the supporting documentation, I find that the request set forth above has been justified for relief from the requirement of 10 CFR 835.1101(a) for release of materials and equipment, specifically mill tailings haul trucks from radiological areas for use in controlled areas when prior use suggests that the contamination levels on inaccessible surfaces are likely to exceed the values specified in appendix D to 10 CFR 835. Specifically, I find that the exemption criteria at 10 CFR 820.62 have been met. I have read the exemption request and the technical position prepared by the Office of Worker Protection Programs and Hazards Management (EH-52) and have determined that the exemption is authorized by law; will not present undue risk to public health and safety, the environment, or facility workers; and is consistent with the safe operation of a DOE nuclear facility. I also find that the special circumstances, described in the technical position prepared by EH-52, constitute a sufficient basis upon which to grant this exemption.

On the basis of the foregoing, I hereby approve UMTRA/MKF's request for exemption from the stated section of 10 CFR 835. This exemption is conditional upon UMTRA/MKF incorporating the following controls in their Radiation Protection Program (RPP):

- o All maintenance or repair services involving access to the potentially contaminated surfaces of the vehicles are to be conducted as radiological work in controlled areas, or the vehicles are to be surveyed in accordance with 10 CFR 835.1101(a) prior to performing the work on the vehicles; and
- The vehicles may only be used to transport UMTRA/MKF related material, or the vehicle is to be surveyed in accordance with 10 CFR 835.1101(a) prior to other use.

The above exemption only applies to the release of uranium mill tailings haul trucks from a radiological area to a controlled area. The criteria for unrestricted release of property from DOE facilities are currently set forth in DOE Order 5400.5, "Radiation Protection of the Public and Environment." DOE has addressed such releases in the proposed rule, 10 CFR 834.

For the other exemptions that you requested, it was determined that an exemption was not necessary; rather, additional guidance is provided concerning the intent of the applicable 10 CFR 835 requirements (i.e.,  $\S\S$  835.404(b), 835.1101(c)(1), 835.1101(c)(2), and 835.1101(d)). Applicable additional guidance is contained in the technical position accompanying this decision.

Pursuant to 10 CFR 820.66, UMTRA/MKF has 15 days from the date of the filing of this decision to file a Request to Review with the Secretary. The Request to Review shall state specifically the respects in which the exemption determination is claimed to be erroneous, the grounds of the request, and the relief requested. If no Request to Review is submitted, the exemption decision becomes a final order 15 days after it is filed.

Tara O'Toole, M.D., M.P.H.

Assistant Secretary

Environment, Safety and Health

1/5/96 Date